



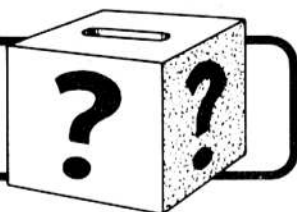
NUCLEAR DIVISION NEWS

A Newspaper for Employees of the Nuclear Division, Union Carbide Corporation

Vol. 4 - No. 18

September 20, 1973

QUESTION BOX



If you have questions on company policies, benefits, etc. or any other problems with which we might help, just let us know. Drop your inquiry to the Editor, Nuclear Division News. (Or telephone it in to your plant news representative . . . see page two). You may or may not sign your name. It will not be used in the paper.

Questions are referred to the proper authorities for accurate answers. Each query is given serious consideration for publication.

Answers may be given to employees personally if they so desire.

QUESTION: Why are so many men promoted to monthly status at the Paducah Gaseous Diffusion Plant, and woman are never considered? It seems that many of the men promoted lately have few or no higher educational achievements, and "job know-how" has taken precedent in their promotions. There are a few positions held by women at the Plant that seem to warrant management status. The women certainly have the qualifications and "job know-how." I heard that the Plant satisfies the equal opportunity committee by using the total Nuclear Division promotions in its report. Women have little incentive to work harder for promotion because of such a negative attitude by management.

ANSWER: During FY-1973 there were 13 promotions from other payrolls to the Paducah monthly payroll. Seven occurred when men were appointed to craft foreman status, and another involved the guard force. The remaining five promotions involved engineering and other technical jobs. Other promotions involved people already on the monthly payroll who moved from one job title to another. You are right — no women were promoted. However, the Paducah Plant's FY-1974 Affirmative Action Plan contains goals that at least two of the approximately 20 anticipated promotions to the monthly payroll will be earned by women. Incidentally, the monthly status of a job is based on its exemption under the Fair Labor Standards Act.

In some cases, such as the craft foreman referred to above, "Job know-how" is one of the most important factors when considering people for promotions. Possession of a college degree or high school diploma is not a requirement for a promotion.

While the Nuclear Division statistics do include those for all of the plants, each plant's statistics are submitted separately and each plant is responsible for meeting its own Affirmative Action goals.

If you have suggestions or other comments to make about the Affirmative Action Program for women in this as well as in other areas, please feel free to talk with your supervisor, your Affirmative

Action Representative, or with Frank Shanklin, Paducah's EO Coordinator.

QUESTION: Veterans employed as school teachers, civil service workers, and in some private corporations are given company service credit for the time spent in active military service — whether they were employed by the company at the time they entered military service or not. Has Union Carbide ever considered extending this benefit to her veteran employees? The time credit could be limited to a maximum of two or three years to prevent excessive favoritism to career military people. This would be a very patriotic gesture by Union Carbide as well as a public relations' asset.

ANSWER: The main rule for company service is to give credit for service earned while actually employed by Union Carbide. In those cases where Union Carbide takes over operations from another company, as is the case of the Y-12 Plant and the Oak Ridge National Laboratory, additional service credit is usually given to all employees who were on the payroll at the time. Company service credit also is given for the first 90 days of the time an employee is on an approved leave of absence, provided he returns to work at the end of the leave.

Employees who enter military service while working for Carbide are given company service credit for the entire time they are in the military service when they return to work for the Company within specified time limitations. This is the typical practice followed by industry.

Your suggestion is appreciated. It has been considered but Union Carbide does not have any plans to change company service credit rules in this respect.

QUESTION: A number of UCC-ND employees drive government vehicles in the performance of their duties. Some of these employees may be unaware that they are not covered by their own liability insurance policy for a liability claim resulting from an accident incurred while driving a government vehicle on Company business. Will the Company defend an

(Continued on page 8)



CONTROLLED TEMPERATURES — David Cox, Aquatic Ecology Laboratory, records data on the effects of thermal change on life in a simulated stream. AEL is part of ORNL's Environmental Sciences Division.

Aquatic ecology lab nears full-scale operating status

Effects of heated water discharged from power plants on aquatic organisms can be reduced or eliminated through timely incorporation of ecological information into site selection and design of cooling water discharge systems.

Such information is being generated in greater quantity and with improved scientific validity at the new Aquatic Ecology Laboratory (AEL) at the Oak Ridge National Laboratory.

Near complete operations

The Aquatic Ecology Laboratory, which is now approaching full-scale operation, is the first facility of its kind in the Southeast. A similar laboratory is operated at the AEC's Pacific Northwest Laboratories.

Some of the experiments which are currently being conducted include survival of fish and other organisms at elevated temperatures; growth rates of fish throughout the range of tolerable temperatures; predation rates of fish exposed to rapid rises and drops in temperature; preferred temperatures of fish; and the mechanical deformation of fish eggs and larvae as they pass through pumps and piping of condenser cooling systems.

The AEL consists of a main building which measures 50 x 100 feet and houses a large experiment room and offices; a service annex, which contains the controls; and six quarter-acre ponds.

Temperature controls

The principal equipment consists of 20

circular tanks containing some 200 gallons of water each in which various species of fish are placed for study.

The temperature of the water in the tanks is precisely controlled in the range of 40 to 110 degrees Fahrenheit by mixing and circulating water supplies of constant-temperature heated and chilled well water and ambient-temperature well water.

A computerized valve control system, soon to be installed, will enable investigators to program experimental temperature fluctuations in the tanks to simulate natural temperature cycles created by thermal discharges from a power plant.

Outside ponds

The AEL also has four additional tanks for testing growth response of fish at varying temperatures and a series of indoor artificial streams to study temperature acclimation of stream invertebrates. Outside are six ponds for holding experimental stock for breeding purposes and for setting up field experiments.

Charles C. Countant is supervisor of the thermal effects program and research at the Aquatic Ecology Laboratory.

Next Issue

The next issue will be dated October 4. The deadline is September 26.

In-house education program awards certificates to 83

A program honoring participants of ORNL's in-house educational program for weekly salaried personnel was held July 25. Division directors or their representatives presented certificates to employees who completed course work in the Office Management and Technicians Development program during the past year.

Employees who received certificates and their divisions are:

Health Physics: Inez T. Fann, Dorothy M. Soard, William F. Fox, John E. Jackson, Margaret R. Matthews, Beverly S. Varnadore and Anna L. McCray.

Reactor: Frances M. Burkhalter, Joan P. Lankford, Margie J. Adair, Jean E. White, Zela S. Trotter, Bettye K. Seivers, Luther P. Pugh, Annabel M. Legg, Viola C. Erickson and June L. Zachary.

Metals and Ceramics: Ruth N. Hengstler, Cordie W. Holland Jr., Charles E. DeVote, Jane R. Morrison, Patricia D. Viles, William M. Ewing and Vernell R. Moore.

Physics: Joan L. Cotter.

Health: Rose Marie Wood.

Environmental Information Systems Office: A. Marie Henley and Wilma Barnard.

Environmental Sciences: J. Marie Davis and Lee E. Tucker.

Director's Division: Anita B. Gill and Coralee H. Ziegler.

Plant and Equipment: Peggy H. Geldmeier, Edward M. Kittrell, John W. Hunley, John H. Mitchell, John W. Prewitt, Jo. F. Ruffner, W.G. Wilson, E.W. Williams, Elvin C. Carter and Austin Sune-son.

Solid State: Janet C. Gentry.

Analytical Chemistry: Wanda C. Massey and Perry S. Gouge.

Instrumentation and Controls: Art L. Case, Charles E. Murphy, Milton A. Meacham, Margaret J. Zedler, Dramia M. Smith and Ocee C. Cole.

Inspection Engineering: George R. Archer.

Chemical Technology: Edward B. Cagle and Janice T. Shannon.

Personnel: Frances E. Garrison, E.L. Fair and Marianne M. Heiskell.

Mathematics: Gail B. Raiford.

Neutron Physics: Jane Gurney and Vivian A. Jacobs.

Operations: Grover A. Moore.

General Engineering: James A. Burgess, James L. Ping, Helen W. Keener, Doris Maddux, Albert E. Williams and Donald L. Anfinson.

Isotopes: Ernest L. Ryan, Frank L. Herron, James C. Smith, W.G. Tatum and Susan K. Whatley.

Information: Dovie E. Patterson, Jeanette H. West, Wanda Ellis and Margaret Carmody.

ORNL-NSF Environmental Program: Jackie W. Sims and Barbara G. Arrington.

Karolyn A. Barnes, Dessie B. Stewart, Violet Holt, Ruby Miller and Donald D. McKelvy also completed courses in the program.

The Personnel Division, through the personnel development and systems department, is responsible for this program. Bert G. Catron is administrator of the program and George L. Joseph serves as director and instructor.

Steady growth

Since its inception seven years ago the program has enjoyed steady and substantial growth in content, participants and the number of divisions involved. This past year 160 participants from 23 divisions took part in the program.

With this substantial growth has come an increased need for instructors. Volunteers who assisted in the leadership of the program included Ada Misk, Frances Garrison, Tom Kollie, Donald Anfinson, Francis McKinney and Lindy Norris.

Program offerings for the coming year will be announced within the next several weeks. Participation in this largely self-study program is voluntary, subject to approval of the participants' supervision.

Among the more popular courses have been a course in reading improvement, one in blueprint reading and two in shorthand. Present plans call for inclusion of these in next year's offering.

Many foreigners visit overlook

More than 7,000 visitors from 43 states and 10 foreign countries visited the Overlook at the Oak Ridge Gaseous Diffusion Plant during the three-month period from Memorial Day to Labor Day.

Foreign countries represented were Australia, Canada, Columbia, Dutch West Indies, France, Germany, Great Britain, Japan, Portugal and Switzerland.

The Overlook has facilities which describe the role of the gaseous diffusion plants - and other atomic energy facilities operated by Union Carbide Corporation - in meeting the free world's growing power needs.

The facilities at the gaseous diffusion plant are identified on a large aerial photograph in the Overlook. Also available are a taped message, several exhibits, and a "Visitor's Information" pamphlet.

Visitors also are invited to visit the Graphite Reactor at Oak Ridge National Laboratory, which is a National Historic Landmark, and the American Museum of Atomic Energy in Oak Ridge.

A picnic area is maintained at the Overlook for the convenience of visitors.



HEALTH PHYSICS DIVISION — Walter S. Snyder, assistant director, presented certificates to seven members of his staff. From left, Snyder, Inez Fann, Dorothy Soard, John Jackson, William Fox, Margaret Matthews, Beverly Varnadore and Anna McCray.



TEN TO TEN — The Reactor Division tied with the Plant and Equipment Division for the largest number of participants in the educational program for weekly salaried employees at ORNL. Both Divisions had ten members receive certificates. From left, Samuel E. Beall, director, Reactor Division; Viola Erickson, Annabel Legg, Luther Pugh, Bettye K. Seivers, Margie Adair, Jean White, Frances Burkhalter and Zela Trotter.



INSTRUCTORS AND ADMINISTRATORS — Instructors of the educational programs for weekly salaried employees are shown with Bert G. Catron, director of personnel development and systems department, and James A. Barker, director of the Personnel Division. From left, Catron, Barker, Ada Misk, Finance and Materials; Tom G. Kollie, Metals and Ceramics; Frances E. Garrison, Personnel; Donald L. Anfinson, General Engineering; Francis McKinney, Information; and George L. Joseph, Personnel, coordinator of the programs.

NUCLEAR DIVISION NEWS

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NUCLEAR DIVISION

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APPALACHIAN INDUSTRIAL

EDITORS' ASSOCIATION

INTERNATIONAL ASSOCIATION OF
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Judith W. Phillips

United Way campaign chairmen named in Oak Ridge

Melvin E. Koons, executive assistant of the Nuclear Division, will head up the United Way Campaign for the General Staff.

Koons joined the Nuclear Division in 1970, after seven years with Oak Ridge Associated Universities where he was head of the office of legal and general services.

He is a native of Minneapolis, and holds law and journalism degrees from the University of North Dakota.

He has been active in civic and community affairs in Oak Ridge, serving as director of the campaign for the March of Dimes. He is past president and a member of the board of the Oak Ridge Chapter of Sertoma International. He served as UF drive chairman at ORAU for two years while there.

Koons and his wife, Mellie, live at 104 Macon Lane, Oak Ridge. They have four sons, Monty, Steve, Jeff and Gary.

Chairman of the United Way Campaign at the Y-12 Plant is William R. (Ron) Ragland, superintendent of Y-12's Accounting and Budget Division.

Ragland, a native of McKenzie, Tenn., was educated in the Roane County schools and earned his B. S. degree in industrial management at The University of Tennessee.

He joined the Union Carbide organization in March, 1960, after working in the Electronic Division of Corning Glass Corporation, Bradford, Pa.

Active in Kingston and Roane County community affairs, he serves as chairman of the Roane County Regional Planning Commission and as treasurer of the Kingston Community Children's Theater. He is a past president of the Cherokee Parent Teachers Association and the Kingston Investors Club.

Ragland lives at 411 Edgewater Estates, Kingston. Mrs. Ragland is the former Barbara Sproles, and they have one son, Stephen.



Melvin E. Koons

Edwin H. Krieg Jr., is the United Way Chairman for the Oak Ridge Gaseous Diffusion Plant. Krieg is superintendent of the maintenance engineering department.

Krieg is a native of Ridgewood, N.J. He graduated from Brown University and Stevens Institute of Technology with degrees in mechanical and industrial engineering. After serving for three years in the U. S. Navy, Krieg joined the Linde Division of Union Carbide in 1957. In 1969 he transferred to the Nuclear Division.

During the 1972 United Way drive, Krieg served Anderson County as a Union Carbide "loaned executive."

Krieg and Peg, his wife, live at 108 Normandy Road, Oak Ridge. They have a son, Paul.

James C. White, director of the Analytical Chemistry Division, is United Way Chairman for the Oak Ridge National Laboratory.

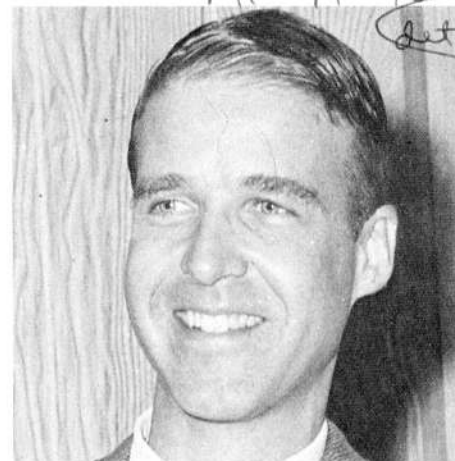
White was born in Fort Wayne, Ind. He received the B. S. degree from Indiana University. After serving for three years in the Chemical Warfare Service of the U. S. Army, he entered Ohio State University where he received the M. S. and Ph.D. degrees. White joined the ORNL staff in 1950.

White has served as officer and advisor for many professional and technical organizations. He holds fellowship in the American Association for the Advancement of Science and the American Institute of Chemists. He is a member of Phi Lambda Upsilon and Alpha Chi Sigma.

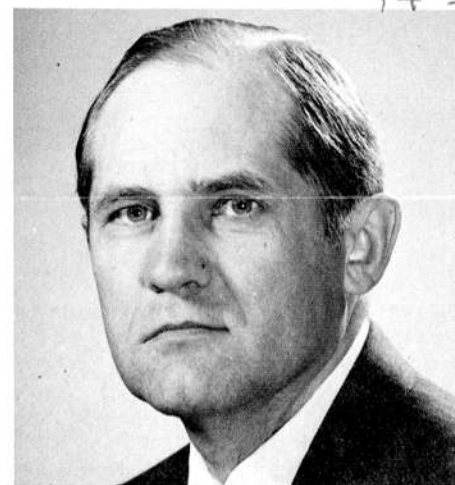
White and his wife, the former Mary Frechtling, live at 5425 Shenandoah Trail, Knoxville. They have four children.



William R. Ragland



Edwin H. Krieg Jr.



James C. White

September 24-28

International Conference on Atomic Collision in Solids. Mountain View Hotel, Gatlinburg. Sheldon Datz, chairman.

September 28

Metals and Ceramics Division Seminar: "Subcritical Crack Growth in Reactor Structural Materials," by Lee A. James, Westinghouse Hanford Company. Building 4500-S, conference room, 9 a.m.

October 4

Bimonthly Information Colloquium: "Lung Cancer Studies at ORNL," Paul Nettesheim; "Topics of Current Interest at ORNL," Floyd Culler. New Jefferson Junior High School, 7:30 p.m.

COMMUNITY

September 22

Sidewalk Art Show, in front of Miller's Department Store, Downtown. 9 a.m.-4 p.m.

September 30

Film Club: "Battle of Algiers," Italy, 1966. Jefferson Junior High School, 8 p.m. Adults, \$1.50, students, \$1.

Playhouse Open House. Oak Ridge Playhouse, 8 p.m.

Coffee Concert: Bill Albrecht, accompanied by Jan Wing, also Oak Ridge String Quartet. Civic Center, 8:15 p.m. Refreshments. Free to public.

Judith Phillips earns CPS title at ORGDP

Judith W. Phillips, Oak Ridge Gaseous Diffusion Plant's Operations Division, was one of the 10 Nuclear Division secretaries to be named a Certified Professional Secretary recently.

Mrs. Phillips began work in the Fabrication and Maintenance Division in 1966, and prior to coming with Union Carbide, was with the National Outboard Association in Knoxville. She is a graduate of the Knoxville Business College and has participated in the National Secretaries Association-sponsored courses.

Mrs. Phillips and her husband, John K. II, live at Route 3, Finley Drive, Lenoir City. He is an instrument mechanic at ORGDP. She is currently on maternity leave from Union Carbide.

Pasttime activities include church work (teaching Sunday School), playing the piano and reading.



INDIVIDUAL PERFORMANCE — Stressing the individual employees role in attaining last year's outstanding safety performance, Y-12's Plant Superintendent, Jack M. Case, sent the three plaques out into the plant recently via union representatives. From left are B. W. Hensley, president of the Atomic Trades and Labor Council; Clarence E. Johnson, safety director; Norman O'Neal, secretary-treasurer of ATLC; Case; and George F. McPherson, secretary-treasurer of local three of the International Guards Union of America. The plaques came from Union Carbide Corporation, the Atomic Energy Commission, and the National Safety Council.

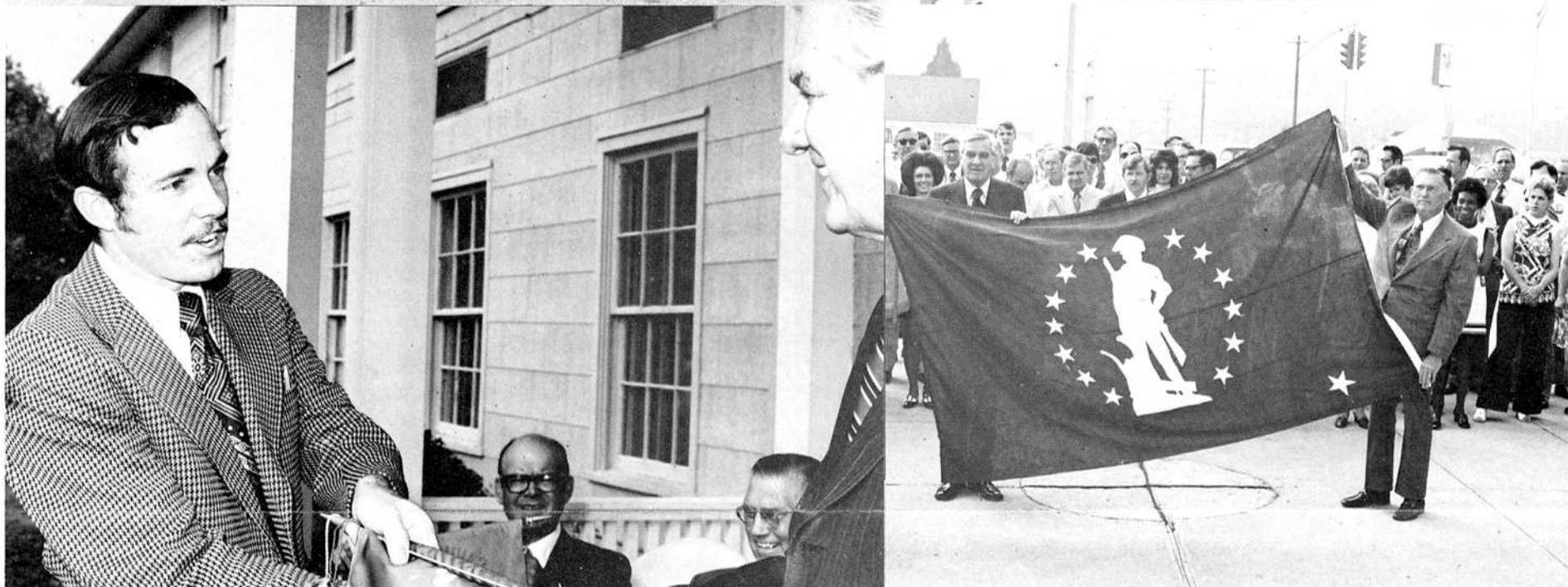
Calendar of EVENTS

TECHNICAL

September 20

GCR and HTGR Programs Bimonthly Information Colloquium: "Coating Studies in 5-inch-diameter Coater," W. J. Lackey; "HTGR Fuel and Graphite Testing Facilities in ORR (Capsules OF-1 and OG-1)," J. A. Conlin; "HTGR Fissile Fuel Testing Program," J.L. Scott; "HTGR Safety Program Plan," P.R. Kasten. Building 4500-N, East Auditorium, 9 a.m.

Solid State Division Seminar: "Neutron Irradiation Effects and Structure of Noncrystalline SiO₂," J.B. Bates, Building 3025 Conference Room, 10 a.m.



Rites mark bond drive's big success

Ceremonies were held recently in Oak Ridge and Paducah at which representatives of the U. S. Treasury Department presented special awards to Nuclear Division groups for participation in the U. S. Savings Bond program.

Honored were the Oak Ridge Gaseous Diffusion Plant, Oak Ridge Y-12 Plant, Paducah Gaseous Diffusion Plant and General Staff — all of which achieved more than 50 percent participation in the Payroll Savings Plan.

Among those participating in the ceremonies were Rafael M. Morvant, Southern Marketing Director, U. S. Savings Bonds, and E. Edward Foland, East Tennessee Area Manager, U. S. Savings Bond Division, Treasury Department.

Interest in the U. S. Savings Bond program has been growing steadily among Nuclear Division employees. At present, 9,471 employees — more than 64 percent — are savings bonds through the Payroll Savings Plan.

Shown on this page are some of the scenes at presentations at the various Nuclear Division facilities.

A U. S. Treasury flag was presented by officials to the Paducah Plant, as more than 80 percent of Paducah employees are purchasing Bonds through payroll deductions. Photos of these ceremonies will appear in the next issue.



COMPANY Service

20 25 30

Y-12 PLANT 30 YEARS



Kennedy



Nicely

Six additional Y-12ers mark important 30 year anniversaries soon.

John L. Kennedy, research services, lives at Route 17, Laurel Oak Lane, Knoxville.

Residing at 421 Bridgeview Road, Knoxville, is Blake F. Nicely, buildings, grounds and maintenance shops.



Oliver



Mrs. Tackett

Edwin E. Oliver, electronic and electrical department, lives at 5710 Wallwood Drive, Knoxville.

Madeline M. Tackett, cafeteria, lives on Walden Street, Lake City.



Shoemaker



Watson

James H. Shoemaker, plant protection department, lives at 424 Hicks Street, Clinton.

William W. Watson lives at Route 3, Clinton. He is in area five maintenance.

25 YEARS

James C. Thompson Jr., Edward L. Stooksbury, Altus D. Tucker and Clarence Brown.

20 YEARS

Reed D. Atkins, Eulysse Smith, William W. Smith, Albert J. Neleppa Jr., Malcolm P. Crews Jr., Mason A. Butler Jr., Arthur G. Hensley, Delbert E. Wilson, Michael E. Scrivner, Thomas R. Kirkland, Edward Luttrell, Murray A. Parrish, Kimsey H. Hamby, Robert P. Putman and John W. Llewellyn.

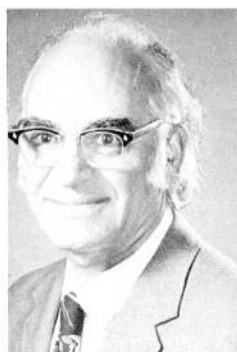
ORGDP 25 YEARS

Willard E. Hobbs, Roger W. Anderson, James D. Ruffner and Ted Lee.

20 YEARS

Hubert M. Hembree and Frank T. Ayers.

ORNL 30 YEARS



Levy

Henri A. Levy, Chemistry Division, is originally from Southern California. His first duties at ORNL included the preparation of high-level radioactive materials and development of the RALA process. He is presently engaged in studying the atomic structure of solids and liquids by neutron and X-ray diffraction. Levy and his wife, the former Bettie Juresco, live at 116 Meadow Road, Oak Ridge. They have two children.

Casimer J. Borkowski is director of the Instrumentation and Controls Division. He resides with his family at 123 Outer Drive, Oak Ridge.

25 YEARS

Oliver W. Russ Jr., Robert E. Schaich, Jay C. Pigg, Johnny R. Keys, Herbert H. Ely, Carroll W. Piper, A. A. Palko, John R. Sites, Charles J. Barton Sr., Genevieve L. Downs, Joe R. Walton, Edward C. Long Jr., Robert S. Stone and Ruby D. Wilkerson.

20 YEARS

Amos H. Marshall, Joseph D. Pendleton, Charles F. Ziegler Jr., John R. Engel, Willard C. Marlar, Robert L. Hamner, Hugo W. Bertini, Alfred M. Perry Jr., Tom B. Fowler, Elery D. Cross, Lorraine S. Abbott, David K. Trubey, Norman D. McCollough Sr., and H. Clyde Claiborne.

GENERAL STAFF

25 YEARS

Walter S. Rule Jr.

20 YEARS

W. Charles Kuykendall.

PADUCAH

20 YEARS

Ernest Griffin and Howard J. Douglas.

OTHER UNITED WAY OFFICIALS

Associate general chairmen for the Nuclear Division's United Way campaign are: ORNL - Norm L. Beeler, A.T.L.C. and James M. Dixon, I.G.U.A.; and Y-12 - B.W. Hensley, A.T.L.C. and Millard N. Wilkerson, I.G.U.A.

Other Carbiders involved in the "behind the scenes" activities for the 1973 campaign include: Marion H. Randolph, ORGDP, assistant general chairman and computer reports manager; Nelson H. Bethea, Y-12, campaign documentation manager; Ruby A. Miller, General Staff, publicity manager; Gerald J. Doyle, Y-12, campaign materials manager; Harry J. Brown, General Staff, treasurer; and Gene White, General Staff, payroll auditor.

Experience the joy of giving the United Way.

ORGDP Industrial Relations names Levenhagen to position

Charles F. Levenhagen has been named head of the personnel development and training department in the Industrial Relations Division at the Oak Ridge Gaseous Diffusion Plant. He joined the Linde Division of Union Carbide in 1960, in Speedway, Ind., and transferred to the Materials Systems Division, Mobile, Ala., in 1964. He returned to the Linde Division in 1972, in Indianapolis, Ind., and worked there until transferring to Oak Ridge.

A native of Vincennes, Ind., Levenhagen graduated from Indiana University and has done graduate work at Butler University. He served in the U. S. Army from 1953 until 1956, and in the Reserves until 1958.

From 1964 until 1973, he represented UCC on the Governor's Cost Control Committee for the State of Alabama. This committee studied administrative branches of the state government to find more efficient methods for managing the State's business.

The Levenhagens live at 1066 West Outer Drive, Oak Ridge. They have four children, Jeffrey, Steven, Brian and Karen.



Charles F. Levenhagen

Foreign travel

Ted S. Lundy and Hugh S. Isaac, Metals and Ceramics Division at ORNL, attended the International Conference on Stress Corrosion Cracking and Hydrogen Embrittlement of Iron Base Alloys in Unieux-Firminy, France, June 12-16. Isaac presented a paper entitled "Electrochemistry of Simulated Stress Corrosion Cracks."

Lundy presented a paper entitled, "Cation Self Diffusion in Rutile," at the Conference on Lattice Defects in Ionic Crystals, Marseille-Liminy, France, July 2-6. The paper was coauthored by William A. Coghlan.

Alford H. Narten, Chemistry Division, presented an invited lecture on X-ray and Neutron Scattering at the symposium on "Structure of Water and Aqueous Solutions," which was held in Marburg, Germany, July 5 and 6.

Fred C. Hartman, Biology Division, attended the Ninth International Congress of Biochemistry in Stockholm, Sweden, July 1-7. He presented a paper entitled, "Affinity Labeling of Ribulose Biphosphate Carboxylase."

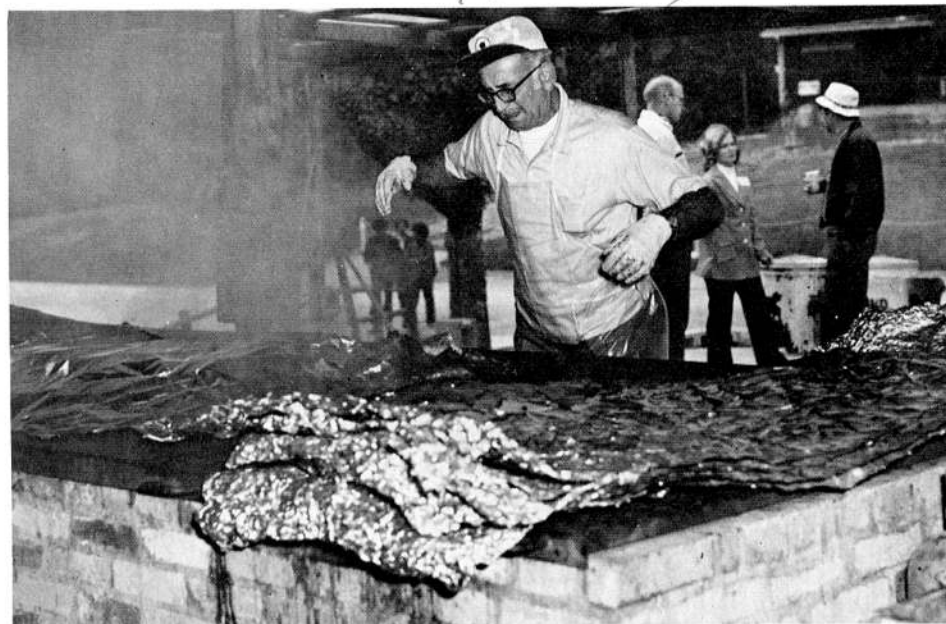
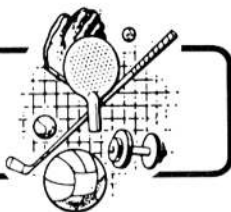


MARRIED — Miss Lynda C. Corbin and Daniel N. Hart were married September 1 in Opelika, Ala. Mrs. Hart is a junior at Auburn University, and the bridegroom will graduate there in December. He is a former co-op student in the Technical Division at ORGDP, and is the son of John D. Hart, ORGDP.



1972 UNITED WAY CAMPAIGN — All members of the shift supervisors' group at ORNL were 100% fair-share givers in last year's campaign. From left are Leila Heidel, Grover C. Cain, W. F. (Woody) Spencer and J. Harold Greene. John W. Brown Jr., and William S. Hornbaker were not present.

RECREATIONOTES



CAREFUL HANDS — Meat, long on the smouldering coals and steeped in delicious sauce, is the mainstay of the K-25 Barbecue-Hootenanny set at the Clark Center Recreation Park Saturday, September 29. Tickets are available throughout the plant.

BARBECUE-HOOTENANNY

The Annual K-25 Barbecue-Hootenanny is set for Saturday, September 29. Tickets, available to ORGDPers in all divisions of the plant, are \$1.50 for adults, 75 cents for children. (Tickets for retired employees from ORGDP may be obtained through the Recreation Department, extension 3-5833.)

A Shiftmen will do their usual job of barbecuing the delicious meat for the feast. There will be ample trimmings and drinks.

Other Carbiders are advised that the Clark Center Recreation Park will be closed Friday and Saturday, September 28 and 29 to everyone except those attending or those connected with the barbecue.

Old-timers in the plant point out to the many new employees that this is a good chance to get to meet everyone... as practically everyone shows up for the affair.

CARBIDE GOLF

Avis and J. D. Collins placed first in the South Hills Shift League, ahead of W. A. Rutherford and C. W. Nelson. Ed Sise and Charlie Baxter came in third in the shift duffing matches.

The Cozart-Graham pair eked out victory in the South Hills Golf League, a mere one point ahead of Sise-Boyd. Patterson-Cogswell (who won a nine hole playoff) came in third.

Final results in the Melton Hill Golf League gave victory to the Lampton-Waggoner-Raines-Anderson combo, only three points ahead of Reed-Cowder-Butturi-Emery.

A play-off will be held to determine the third-placed team as the Alvey-Gresham-Carmack-Pryson and Stephens-Campbell-Starlin-Dagley teams tied with 54 points won each.

The D Shift Golf League finished up recently, ending summer play, with the Sharp-Rose team in first place. Miller-Giffin came in second; Martin-Kidd in third.

SKEET LEAGUE

Y-12er Jim Rhew copped first place in August skeet firing, pulling down a 48.923 score. He was followed by Perry Bullard, also from Y-12, with a 48.313. Vern Raaen, ORNL, took third skeet ratings with a 48.165.

SHIFT PICNIC

Y-12's E, F, G, H and J shifts staged a big picnic recently at the Clark Center Recreation Park. More than 150 employees and members of their families attended the watermelon-cutting, gametime party.

PISTOL TRAINING COURSE

The Oak Ridge Sportsman's Association will sponsor a training course for persons interested in learning how to safely use a pistol. The course is scheduled to begin October 11.

Troy N. Burklow Jr., ORGDP, will teach the course. He has been certified as an instructor by the National Rifle Association.

CAMERA CLUB

The Carbide Camera Club has set November 1 as entry deadline for the annual salon. All black and white prints, slides and color prints should be turned in by then.

Official rules are available, and were attached to the October newsletter. Additional information may be obtained from members Chap Toomer, 3-3827; Carole King, 3-5664; Bob Stephenson, 3-1369; or Terry Domm, 3-3031.

October's competition features black and white prints, nature and wildlife subjects.

PADUCAH BOWLING

In 1973, bowling records were made when the Scrappers won a hair-raising match from the second place Strike-Outs to become league champions for the third consecutive year. The Scrappers are made up of Capt. John Weglarz, Dave Wallace, Frank Henson, Bob Douglas, Scottie Ray, Dale Meyer and Jim Orazine. The feat had never been done since the league's founding in 1951. Capt. Weglarz said that he "wanted to thank the Googins," captained by Jim Brown, "for their special

If you are interested in taking the course, contact Burklow at extension 3-9682 or Oak Ridge 483-3646.



WEAR SOFTBALL LAURELS — The Snakes dominated the summer Softball League in Oak Ridge, downing some 19-20 foes, losing only one game the entire season. They won the play-off by handily defeating Tom's Gizzards. In the front row, from left, are Earl Nall, Horace Moorman, Everett Stacy, Rick Stacey, Kelly Glasgow, Russ Hand and Jerry Harris. In the back row are Horace Miller, E. T. Stamey, Arnold Hawkins, Calvin Angel, Bob Culton, Harold Conner, Mike Sherrill and Richard Tate.

assistance in helping his team set this record."

ORGDP GOLF

The final tournament of the year for K-25ers belongs to George Wylie, as his 77 score on the Gatlinburg greens proved low for the high-rise contest. Willard Moore came in second with a 79. Handicap lows went to David Byrd, 80; and J. A. Duff, 82.

S. Kopplin, R. E. Nier and P. Pasqua all counted nine pars in the first division.

Flight two fell to T. Mott with an 86; and Pete Leslie with an 87. In handicap scoring, it was P. S. Cates and Howard Phillips, with 87 and 94 respectively.

J. Horton and Ron Campbell carded five pars.

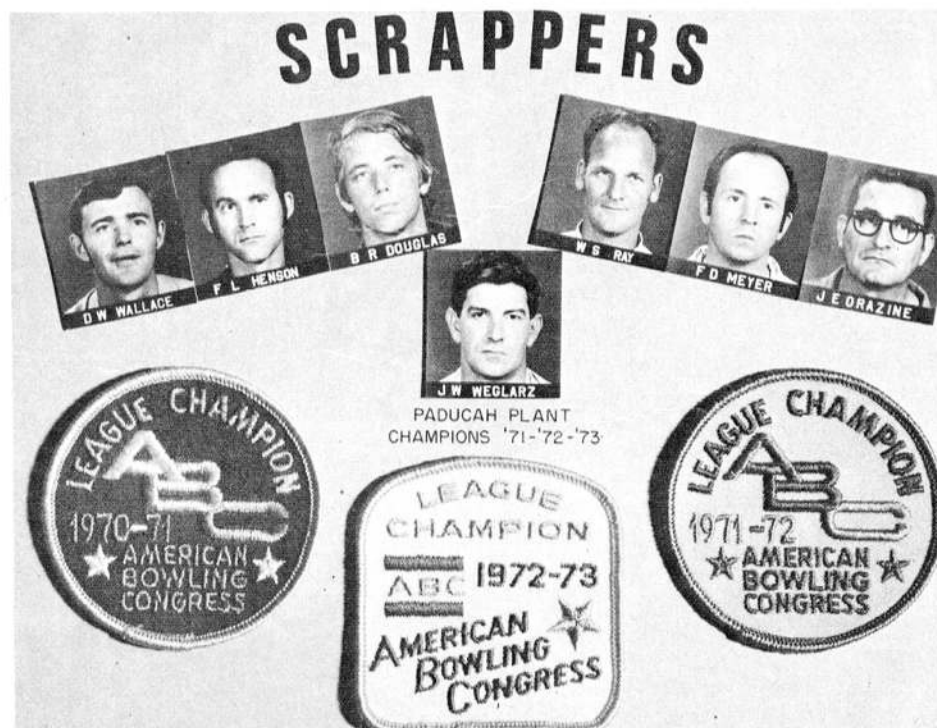
Flight three belonged to O. A. Rogers, 89; and Wayne Groppe, 97.

In handicap honors, it was John Shelton, 107; and C. G. Holmes, 113.

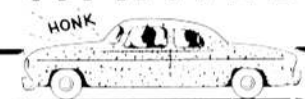
R. L. Higgins and Glen Nelson parred two holes.

Y-12 BOWLING

The Y-12 Mixed League got two rolls under its belt, with the Rollers and Alley Cats tied for first place, each without a loss as yet. C. R. Lively, Rollers, put a 235 scratch game up last week for other bowlers to shoot at.



WANTED



Y-12 PLANT

RIDE from Coster Road, Inskip, to North or Central Portal. Becky Parks, plant phone 3-7283, home phone Knoxville 687-7007.

RIDE from 133 Newberry Circle, Oak Ridge, to North Portal, straight day. Glen R. Walls, plant phone 3-5589.

RIDE from 183 Manhattan Avenue, Oak Ridge, to North Portal, straight day. T. E. Verner, plant phone 3-7141.

RIDE or will join car pool from Kingston, to North or Biology Portal, straight day. L. C. Vann, plant phone 3-7789, home phone Kingston 376-7548.

ORGDP

CAR POOL members wanted from West Haven section, Knoxville, to AEC - Carbide Purchasing area, Chris Clements, plant phone 3-4628, home phone Knoxville 523-0966.

'Diet — and the peptic ulcer'

(Editor's Note: Dr. Lincoln alternates his regular column with "The Medicine Chest," where he answers questions from employees concerning their health in general. Questions are handled in strict confidence, as they are handled in our Question Box. Just address your question to "Medicine Chest," NUCLEAR DIVISION NEWS, Building 9704-2, Stop 20, or call the news editor in your plant, and give him your question on the telephone.)

By T. A. Lincoln, M.D.



The recent article, "The Muddle of Diets for Gastrointestinal Disorders", by Dr. Robert M. Donaldson, of Boston University School of Medicine, which appeared in the September 3 issue of the *Journal of the American Medical Association*, has received considerable attention by the news media. Although the article covered diets for all kinds of gastrointestinal diseases, the influence of diet on peptic ulcer is probably of greatest interest. Dr. Donaldson presented nothing new. He just emphasized what many physicians have thought and a few have written about over the past 20 years. What he said was that diet has very little to do with either causing or successfully treating peptic ulcer.

Many people believe that hard work under severe nervous tension causes peptic ulcers. Such a belief is largely nonsense. Although people in some types of high pressure work seem to have more ulcers, it is probable that their basic personality is the crucial factor. Some individuals who develop peptic ulcer, at least when young or in middle age, are extremely conscientious and hard-working. Part of this effort is made to quiet an inner insecurity. Work meets part of their needs for love, recognition and attention. Unfortunately, so psychologists say, work seldom meets their needs adequately. Such individuals work harder and harder but still never reach their goals, which always remain just beyond their reach.

Promotions and ulcers

In some, their internal nervous signals seem to get crossed up and an early association of security with food begins to cause a disturbance in the secretion of acid in their stomachs. As a baby, eating or nursing time was their most secure time. Thus food and security got deeply intertwined in their psyches. Later, when stress got great, the hunger for peace and security got misinterpreted by their brains as a need for food. Inappropriate nervous signals were sent to their stomachs to produce acid in preparation for the expected food. The excess acid production became chronic and, in combination with other breakdowns, led to ulceration. At any rate, that's what some specialists in psychosomatic medicine say.

It is surprising how often people believe that it's the burden of supervisory responsibility which causes ulcers. Actually, most of these supervisors had stomach trouble fairly early in life long before they got promoted. The promotion didn't cause the ulcer. The individual got promoted because he was the

type to get the job done and unfortunately that may also have meant the type to get an ulcer.

Many people also feel that highly spiced, rough, raw, or fried foods, coffee, and alcohol cause ulcers. If such were the case, the hospitals and doctors' offices would be full of ulcer patients. Such is obviously not the case.

Diet and causes

The cause of peptic ulcer still remains obscure. Many patients do not fit any typical personality pattern. Some are lazy rather than hard working. Some have always lived on a bland diet, never smoked, and are teetotalers.

If diet doesn't cause peptic ulcers, how can one expect it to cure them? Dr. Franz J. Ingelfinger, noted gastroenterologist also from the Boston University School of Medicine, says that precious little real knowledge exists about which foods stimulate and which inhibit secretion or which fortify or weaken tissue resistance.

Several careful studies have shown that the kinds of food the peptic ulcer patient eats have little or no effect on the acid in the stomach or on the course of the peptic ulcer. An exception might have to be made for alcohol and coffee since they do stimulate acid secretion. Dr. Donaldson says that there is no evidence that the "form, consistency, taste, and odor of a food as perceived on the platter has anything to do with the effect of that food on secretions, mucosal integrity, vascularity or motility of the gastrointestinal tract."

Extra rest helps

If all the above is so, what is the physician to do when the patient with a peptic ulcer comes to him for help? Should he tell him, "Go get pizzas and drink beer and forget about your stomach. It will get better." Certainly not.

Most patients with an acute peptic ulcer get better while in the hospital. Perhaps getting away from the job and family is the reason. Now with the high cost of hospitalization and the worry about paying the bill, even that approach may not work. Frequent and regular feedings often accompanied with antacid medication seem to bring relief. If the food a person regularly eats does not cause obvious pain or distress, it is probably okay. Alcohol and coffee should be avoided. Mild tranquilization and medication to reduce acid secretion helps. Extra rest as well as extra exercise are useful.

Dr. Ingelfinger says that dietary injunctions are worthless. Avoiding specific foods because they are thought to "irritate" the stomach is apparently not logical. Breaking the cycle of life style which got the patient into his difficulty and treating him conservatively and sympathetically seems to be best. Diets should not be rigid but should be adjusted to the individual patient's response to a comprehensive treatment program.

Nuclear Division Deaths

Harlan S. Caldwell died August 28 in Oak Ridge Hospital. He was a senior laboratory technician in the Chemical Technology Division at ORNL.



Mr. Caldwell

A native of Graysville, Tenn., Mr. Caldwell came to work at ORNL in July, 1947.

Mr. Caldwell is survived by his wife, Mrs. Helen Caldwell, Norwood Community, Oliver Springs; several stepchildren and stepgrandchildren; and two sisters, Mrs. E. A. Russell, formerly with the Purchasing Division at ORGDP, and Mrs. James E. Metz of Kingston.

Funeral services were held August 31 in the chapel of Martin's Funeral Home, Oak Ridge.

Charles F. Ziegler Jr., a chemical operator at ORNL, died September 8, while on a hunting trip in Knoxville.

Mr. Ziegler served in the U. S. Navy for two years. He worked at ORGDP prior to joining the Isotopes Division in 1953. He was an avid sportsman and enjoyed hunting and fishing with his two sons.



Mr. Ziegler

Survivors include his wife, Mrs. Peggy Attkisson Ziegler, 4311 Walrock Lane, Knoxville; and sons, Charles E. and Ronald W. Ziegler.

Funeral services for Mr. Ziegler were held September 11 in the Chapel of Rose Mortuary with the Rev. Thomas Gatton officiating. Interment followed in the Lynnhurst Cemetery, Knoxville.

Benton M. Robbins, a maintenance mechanic in fabrication and maintenance department at the Oak Ridge Gaseous Diffusion Plant, died September 9.

Mr. Robbins joined Union Carbide in 1945. He was a native of Roane County.



Mr. Robbins

Survivors include his wife, Mrs. Hazelen Johnson Robbins; sons, Royce and Jerry; daughter, Dorris Clark; mother, Mrs. Zora Robbins; four granddaughters; two sisters and five brothers. The Robbins home is at 1218 South Kentucky Street, Kingston.

Funeral services were held at Kyker Funeral Home with the Rev. Ellis Chastee officiating, with interment following in Roane Memorial Gardens.

RETIRED ORNL EMPLOYEE

John Fettinger, formerly of the Plant and Equipment Division at ORNL, died September 3 in an Oak Ridge hospital. Mr. Fettinger retired as a rigger and iron worker in 1956. His family resides on Main Street in Oliver Springs.

Y-12 credit union joins O. I. efforts

The Y-12 Credit Union has joined in the Operation Identification efforts to reduce loss by theft of personal property items.

An etching machine is available from the credit union office (on a seven-day loan basis with a \$15 share guarantee) which will cut identifying marks on metal, glass and other hardware. Stickers are also available at the credit union, showing that all items on the premises have been marked for ready identification for law enforcement agencies. When the etching machine is returned, the \$15 share warranty is released.

The United Way campaign will be underway in your plant soon. Are you giving your needed share?

Local A I C h E will hold annual symposium at UT

The Knoxville-Oak Ridge Section of the American Institute of Chemical Engineers will sponsor its annual Fall Symposium at The University of Tennessee, Knoxville, September 25-27.

The subject of the Symposium is "Toward a National Energy Policy." Speakers from government, private industry, the University, Tennessee Valley Authority and ORNL will discuss technical and legislative alternatives and their social and economic effects. These men are experts in the field of energy, and their advice will help shape our nation's energy policy for the future.

Highlighting the Symposium will be an address by Warren Donnelly entitled, "The Energy Problem: A Congressional Outlook." Donnelly is a senior specialist for the Congressional Research Service of the Library of Congress. He also serves in an advisory capacity to Congress on energy matters.

Since any national energy policy must ultimately be coordinated by the federal government, the congressional outlook at this time may have a decisive impact on our society for decades to come.

Although the material presented at the Symposium will be directed mainly toward chemical engineers, the lectures and discussion are intended to be educational to all. The public is invited to attend.

Copies of the program and registration information may be obtained from H. D. Cochran, extension 3-6492, Building 4505 at ORNL. Advanced registration is encouraged.

Power squadron sets new boating course

The Oak Ridge Power Squadron announces its fall boating course, to begin September 25, at 7:30 p.m., at the Oak Ridge High School.

Additional information on the free course may be obtained from Jim Rowan, extension 3-5167, or Oak Ridge 483-9575; or Harry Corey, 3-7763 or 482-4849.

Y-12ers present paper at Denver



Ammons

Baucum

A report prepared by two Union Carbide development specialists at the Y-12 Plant was presented at the Annual Conference on Applications of X-ray Analysis in Denver, Colo., August 22-24.

The authors are William E. Baucum Jr., and Aubrey M. Ammons. The title of the paper is "X-ray Diffraction Residual Stress Analysis Using High Precision Centroid Shift Measurement Techniques—Application to Uranium-0.75 Weight Percent Titanium Alloy."

The study was made in support of U.S. Atomic Energy Commission programs.

Pohto chairs panel on high pressure

An Oak Ridge Gaseous Diffusion Plant engineer will chair a panel in San Antonio, Tex., next month. Herb A. Pohto will be chairman of a panel on "Applications of High Pressure — Current and Future," at the Second International Conference on Pressure Vessel Technology. The panel will consist of seven internationally known experts in the field of high pressure technology, including four from outside the United States.



Pohto

In the American Society of Mechanical Engineers, Pohto is chairman of the Joint Committee on High Pressure Technology. He serves as chairman of the multi-plant committee on high pressure safety for the Nuclear Division.

QUESTION BOX



(Continued from page 1)

employee for a liability claim if the claim is filed against the employee as a result of an accident incurred while driving a government vehicle in the performance of his duties? If so, does this hold true for the use of a rental or GSA car during the entire time that an employee is in travel status? For example, will the Company defend an employee, involved in an accident, who is assigned to a somewhat remote area (no dining facilities) and who uses a GSA or rental car for transportation to procure a meal?

ANSWER: Employees are covered by liability insurance while driving government vehicles in the performance of official duties under a General Liability Policy maintained by UCC-ND. This policy also provides coverage for an employee while using an authorized rental or GSA car for Company business. Drivers of rental or GSA vehicles may also be covered by liability insurance on such vehicles. Of course, if an employee engages in a personal activity not connected with the authorized use of the GSA or rental vehicle, the employee will be beyond the scope of the UCC-ND liability coverage. However, in the absence of other facts, UCC-ND liability coverage would apply in the example you describe.

ABWA installs new Paducah officers

Frances Hamilton and Gladys Adams were recently elected to offices in the Duchess Chapter of the American Business Women's Association.

Mrs. Hamilton, Paducah's maintenance engineering, was installed as president at the regular meeting held at the Ritz Hotel. She is active in many community activities and secretarial associations.

Mrs. Adams, plant librarian, is also active in community activities and associations. She was named recording secretary of the ABWA.

Other Paducah employees active in the organizations include Jo Grisham, Edith Garnett, Betty Brown and Wilma Payne.

New metal, ceramic articles developed by Y-12 chemists

Two Union Carbide chemists at the Y-12 Plant have developed new methods of fabricating thermally stable oxide-coated metal crucibles and thin-walled ceramic articles.

The scientists, Cressie E. Holcombe Jr., and George L. Powell, developed the techniques in support of U. S. Atomic Energy Commission research programs.

One of the methods involves the plasma-spraying of oxide powders onto a metal substrate which has a coefficient of expansion that is approximately the same as the oxide, thus producing a thermally stable bond between the metal substrate and oxide coating.

The second method involves plasma-spraying of oxide powders onto a metal



Holcombe

Powell

substrate which has a much lower coefficient of expansion than the oxide, thus enabling the oxide to sinter during a high-temperature anneal. Upon cooling, the powder shrinks away from the metal substrate to form a free-standing, ceramic item as thin as twelve-thousandths of an inch.

Patent applications for the development have been filed with the U. S. Patent Office.

Division Retirees



Hedden

Shoptaw

Two Oak Ridge Gaseous Diffusion Plant veterans retired September 1, ending long Union Carbide careers.

William H. Hedden, a maintenance mechanic in Fabrication and Maintenance Division, joined ORGDP in 1945. He lives at Route 3, Oliver Springs.

Howard M. Shoptaw, a maintenance foreman in the general maintenance department, came to ORGDP in 1944. He lives at 130 Outer Drive, Oak Ridge.

Foreign travel

John F. Clarke and Norman H. Lazar, Thermonuclear Division, attended the Sixth European Conference on Controlled Fusion and Plasma Physics in Moscow, USSR, July 30-August 3.

Clarke presented a paper entitled "ORMAK and Neutral Injection." He also visited the Kurchatov Institute in Moscow, and the Physical-Technical Institute at Kharkov.

Lazar presented a paper entitled, "Physics of Target Plasmas in Minimum-B Geometries." His plans also included visiting laboratories in Grenoble, France and Culham, England.

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WINNER VACATIONING — The winner of the 1973 Chevy Nova which was given away by the ORNL Employees Credit Union is Wallace R. Gambill, Chemical Technology Division. Gambill, who left on a vacation trip the day of the drawing, has not yet claimed his prize. Shown with the "prize" are from left, Julian R. Gissell, president of the Credit Union; A. K. Bissell, mayor of Oak Ridge; and Floyd L. Culler, acting director of ORNL. The drawing culminated the Credit Union's silver anniversary celebration.

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